

□ Seawater desalination system-KISH [Keep Irrigating for Sufficient Horticulture] water supply scheme

L20 ANSWER 41 OF 121 HCA COPYRIGHT 2002 ACS

AN 127:283137 HCA

IN Kish, Colin Nicholas

PA Kish, Colin Nicholas, Australia

SO PCT Int. Appl., 23 pp.

CODEN: PIXXD2

DT Patent

LA English

FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
	-----	---	-----	-----	-----
PI	WO 9733832	A1	19970918	WO 1997-AU152	19970312
	W: IL, US				
	RW: AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
	AU 9715180	A1	19970918	AU 1997-15180	19970310
	AU 710973	B2	19990930		
PRAI	AU 1996-8574		19960312		
	AU 1996-9829		19960515		
	AU 1997-15180		19970310		
	AU 1996-9828		19960515		

AB The system consists of the construction of modular deep sea inlet units into which are incorporated flat sheet semi-permeable membranes that produce high quality desalted water using the reverse osmosis process. The modular devices are sunk into the ocean to the appropriate depth anywhere along the continental shelf and produce large vols. of desalted water. The desalted water is collected and brought by appropriately designed and constructed modular sleeved pipeline with compressed air driven pos. displacement pumps to shore based service reservoirs to supply consumers by conventional aqueducts. The modular construction of the scheme allows the pipeline, pumps and inlet units, due to the attached buoyancy device, to be floated to the surface for maintenance and repair. The configuration of the **membranes** allows **self-cleaning**. This cleaning action and brine removal is further enhanced by forcing high pressure air and water to flow past the membranes. The high pressure seawater and the product desalted water are sepd. to prevent contamination. The whole system would be automatically monitored and controlled from operation stations on the shore or from seagoing crafts. Marker buoys on the surface indicate the location of the inlet units.